

ABSTRACT

Exemplary implementations provide flexible approaches to reconcile divergent file system states and/or undo file system commands that may lead to the divergent file system states. Exemplary systems maintain records of file system commands that cause changes to file system states and enable users to selectively undo individual file system commands and/or choose proposed non-conflicting file system schedules. A file system command is decomposed into one or more primitive actions representative of the file system command. Log constraints and object constraints relating primitive actions are used to identify and resolve conflicts between primitive actions.